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09/864,302	05/25/2001	Dinesh Verma	36994-172298	2793
26694 7590 12/29/2006 VENABLE LLP P.O. BOX 34385 WASHINGTON, DC 20043-9998			EXAMINER BOYCE, ANDRE D	
			ART UNIT	PAPER NUMBER
			3623	
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
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Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary

Application No.

09/864,302

Applicant(s)

VERMA ET AL.

Examiner

Andre Boyce

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 05 October 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-72 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-72 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

1. This Final office action is in response to Applicant's amendment filed October 5, 2006. Claims 1-15, 17-27, 30-63, 66-70 and 72 have been amended. Claims 1-72 are pending.
2. The previously pending objection to the oath/declaration has been withdraw.
The previously pending objection to the specification has been withdrawn.
The previously pending objections to the drawings have been withdrawn.
The previously pending objections to claims 22, 30, 32, 35, and 37 have been withdrawn.

The previously pending rejections to claims 8-34 under 35 U.S.C. 112, second paragraph, have been withdrawn.

The previously pending rejections to claims 1-34 and 36 under 35 U.S.C. 101 have been withdrawn.
3. Applicant's arguments filed October 5, 2006 have been fully considered but they are not persuasive.

Claim Objections

4. Claim 14 is objected to because of the following informalities:

Claim 14 recites "wherein said ease of upgrading existing functionality sub-attributes, said plurality of sub-attributes comprises." This language is unclear and confusing. Appropriate correction is required.

Claim Rejections - 35 USC § 102

5. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
6. Claims 1-8, 12, 15-44, 48, and 51-72 are rejected under 35 U.S.C. 102(e) as being anticipated by Abu El Ata (USPN 6,560,569).

As per claim 1, Abu El Ata discloses a decision support system for evaluating supportability of alternative system architecture designs (i.e., design of information systems to determine the best combination of hardware and software applications, column 1, lines 49-55) comprising: an analytic hierarchy process (AHP) model (i.e., modeling of information system in a top/down approach, column 8, lines 56-63) comprising a plurality of supportability attributes at a first level (i.e., multiplatform system consisting of multiple layers, column 9, lines 1-5), wherein said plurality of supportability attributes comprises: a commonality attribute (i.e., application architecture layer, column 9, lines 23-27); a modularity attribute (i.e., application architecture layer, column 9, lines 23-27); a standards based attribute (i.e., operating environment layer, column 9, lines 23-27); and a reliability, maintainability, testability (RMT) attribute (i.e., application implementation layer, column 9, lines 23-27), an analysis module (i.e., construction module 18, figure 1), adapted to assign relative

weights to each supportability attribute on said first level and to perform pair-wise comparisons of said plurality of attributes on said first level (i.e., designer makes selection based upon the performance metric of each model in comparison with the other models, column 5, lines 37-42); an evaluation module (i.e., performance metrics module 24, figure 1), adapted to assign a global priority weight (GPW) to each of a plurality of alternative system architecture designs (i.e., calculation of performance metric for each model, column 5, lines 25-27) and to compare values of said GPWs of said plurality of said alternative system architecture designs (i.e., designer makes selection based upon the performance metric of each model in comparison with the other models, column 5, lines 37-42); and a user interface, adapted to display said GPWs to a user and to receive a selection of a referred system architecture design based on said comparison of the values of said GPWs (i.e., output 28 to an output device, column 4, lines 64-67).

As per claim 2, Abu El Ata discloses a plurality of sub-attributes of said commonality attribute, said plurality of sub-attributes of said commonality attribute comprising at least one of a physical commonality sub-attribute (i.e., construction module determines application compatibility, column 7, lines 1-3); a physical familiarity -sub-attribute; and an operational commonality sub-attribute.

As per claim 3, Abu El Ata discloses a plurality of sub-attributes of said physical commonality sub-attribute, said plurality of sub-attributes of said physical commonality sub-attribute comprising at least one of a hardware (HW) commonality

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sub-attribute; and a software (SW) commonality sub-attribute (i.e., application compatibility, column 7, lines 1-3).

As per claim 4, Abu El Ata discloses a plurality of sub-attributes of said hardware commonality sub-attribute, said plurality of sub-attributes of said hardware commonality sub-attribute comprising at least one of: a number of unique lowest replaceable units (LRUs) sub-attribute (i.e., hardware components, including models of different types of components, column 6, lines 13-16); a number of unique fasteners sub-attribute; a number of unique cables sub-attribute; and a number of unique standards Implemented sub-attribute.

As per claim 5, Abu El Ata discloses a plurality of sub-attributes of said software commonality sub-attribute, said plurality of sub-attributes of said software commonality sub-attribute comprising at least one of a number of unique SW packages implemented sub-attribute (i.e., selection of software components, column 5, lines 14-19); a number of languages sub-attribute; a number of compilers sub-attribute; a average number of SW instantiations sub-attribute; and a number of unique standards implemented sub-attribute.

As per claim 6, Abu El Ata discloses a plurality of sub-attributes of said physical familiarity sub-attribute, said plurality of sub-attributes of said physical familiarity sub-attribute comprising at least one of a percentage vendors known sub-attribute; a percentage subcontractors known sub-attribute; a percentage HW technology known sub-attribute; and a percentage SW technology known sub-attribute (i.e., hardware

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components 54 and software components 58 are contained in component library and are therefore 100% known, column 6, lines 9-13).

As per claim 7, Abu El Ata discloses a plurality of sub-attributes of said operational commonality sub-attribute, said plurality of sub-attributes of said operational commonality sub-attribute comprising at least one of a percentage of operational functions automated sub-attribute (i.e., business response or process time including non automated processes, column 16, lines 61-63); a number of unique skill codes required sub-attribute; an estimated operational training time - initial sub-attribute; an estimated operational training time refresh from previous system sub-attribute; an estimated maintenance training time - initial sub-attribute; and an estimated maintenance training time - refresh from previous system sub-attribute.

As per claim 8, Abu El Ata discloses a plurality of sub-attributes of said modularity attribute, said plurality of sub-attributes of said modularity attribute comprising at least one of: a physical modularity sub-attribute; a functional modularity sub-attribute; an orthogonality sub-attribute; an abstraction sub-attribute; and an interfaces sub-attribute (i.e., models of other components, including input/output devices, column 6, lines 20-24).

As per claim 12, Abu El Ata discloses a plurality of sub-attributes of said functional modularity sub-attribute, said plurality of sub-attributes of said functional modularity sub-attribute comprising at least one of an ease of adding new

functionality sub-attribute (i.e., degree of parallelism, column 17, lines 31-33); and an ease of upgrade existing functionality sub-attribute.

As per claim 15, Abu El Ata discloses a plurality of sub-attributes of said orthogonality sub-attribute, said plurality of sub-attributes of said orthogonality sub-attribute comprising at least one of a determination of whether functional requirements are fragmented across multiple processing elements and interfaces sub-attribute; a determination of whether there are throughput requirements across interfaces sub-attribute (i.e., throughput of number of units, column 15, lines 4-6); and a determination of whether common specifications are identified sub-attribute.

As per claim 16, Abu El Ata discloses a plurality of sub-attributes of said abstraction sub-attribute, said plurality of sub-attributes of said abstraction sub-attribute comprising: a determination of whether the system architecture provides an option for information hiding sub-attribute (i.e., degree of parallelism, column 17, lines 31-35).

As per claim 17, Abu El Ata discloses a plurality of sub-attributes of said interfaces sub-attribute, said plurality of sub-attributes of said interfaces sub-attribute comprising at least one of a number of unique interfaces per system element sub-attribute; a number of different networking protocols sub-attribute (i.e., network layers, column 9, lines 25-27); an explicit versus implicit interfaces sub-attribute; a determination of whether the architecture involves implicit interfaces sub-attribute; and a number of cables in the system sub-attribute.

As per claim 18, Abu El Ata discloses a plurality of sub-attributes of said standards based attribute, said plurality of sub-attributes of said standards based attribute comprising at least one of: an open systems orientation sub-attribute (i.e., operating environment layer, column 9, lines 23-27); and a consistency orientation sub-attribute.

As per claim 19, Abu El Ata discloses a plurality of sub-attributes of said open systems orientation sub-attribute, said plurality of sub-attributes of said open systems orientation sub-attribute comprising at least one of an interface standards sub-attribute; a HW standards sub-attribute (i.e., hardware components 54, column 6, lines 21-25); and a software standards sub-attribute.

As per claim 20, Abu El Ata discloses a plurality of sub-attributes of said interface standards sub-attribute, said plurality of sub-attributes of said interface standards sub-attribute comprising at least one of: a number of interface standards/number and number of Interfaces sub-attribute (i.e., models of input/output devices, column 6, lines 21-25); a determination of multiple vendors existing for products based on standards sub-attribute; a multiple business domains apply/use standard sub-attribute; and a standard maturity sub-attribute.

As per claim 21, Abu El Ata discloses a plurality of sub-attributes of said hardware standards sub-attribute, said plurality of sub-attributes of said hardware standards sub-attribute comprising at least one of: a number of form factors and number of LRUs sub-attribute; a multiple vendors exist for a products based on standards sub-attribute; a multiple business domains apply/use standard sub-

attribute (i.e., descriptive data includes a description of the business processes, column 4, lines 15-19); and a standard maturity sub-attribute.

As per claim 22, Abu El Ata discloses a plurality of sub-attributes of said software standards sub-attribute, said plurality of sub-attributes of said software standards sub-attribute comprising at least one of: a number of proprietary & unique operating systems sub-attribute (i.e., software components 58 include models of software programs, applications, and database management systems, column 6, lines 24-27); a number of non-std databases sub-attribute; a number of proprietary middle-ware sub-attribute; and a number of non-std languages sub-attribute.

As per claim 23, Abu El Ata discloses a plurality of sub-attributes of said consistency orientation sub-attribute, said plurality of sub-attributes of said consistency orientation sub-attribute comprising at least one of: common guidelines for implementing diagnostics and performance monitoring/fault localization (PM/FL) sub-attribute; and common guidelines for implementing operator machine interface (OMI) sub-attribute (i.e., models for input/output devices, column 6, lines 21-24).

As per claim 24, Abu El Ata discloses a plurality of sub-attributes of said RMT attribute, said plurality of sub-attributes of said RMT attribute comprising at least one of: a reliability sub-attribute (i.e., percentage elongation, column 15, lines 20-27); a maintainability sub-attribute; and a testability sub-attribute.

As per claim 25, Abu El Ata discloses a plurality of sub-attributes of said reliability sub-attribute, said plurality of sub-attributes of said reliability sub-attribute comprising

at least one of a fault tolerance sub-attribute; and a critical points of delicateness (system loading) sub-attribute (i.e., elongation factor, column 15, lines 20-27).

As per claim 26, Abu El Ata discloses a plurality of sub-attributes of said fault tolerance sub-attribute, said plurality of sub-attributes of said fault tolerance sub-attribute comprising at least one of a percentage of mission critical functions with single points of failure sub-attribute (i.e., elongation factor, column 15, lines 20-26); and a percentage of safety critical functions with single points of failure sub-attribute.

As per claim 27, Abu El Ata discloses a plurality of sub-attributes of said critical points of delicateness (system loading) sub-attribute, said plurality of sub-attributes of said critical points of delicateness (system loading) sub-attribute comprising at least one of: a percentage of processor loading sub-attribute (i.e., degradation ratio, column 17, lines 16-22); a percentage of memory loading sub-attribute; and a percentage of network loading sub-attribute.

As per claim 28, Abu El Ata discloses a criticality assessment sub-attribute of said percentage memory loading sub-attribute (i.e., degradation ratio, column 17, lines 16-22).

As per claim 29, Abu El Ata discloses a criticality assessment sub-attribute of said percentage network loading sub-attribute (i.e., network utilization, column 15, lines 1-3).

As per claim 30, Abu El Ata discloses a plurality of sub-attributes of said maintainability sub-attribute, said plurality of sub-attributes of said maintainability sub-attribute comprising at least one of an expected MTTR sub-attribute; a

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maximum fault group size sub-attribute (i.e., maximum value of elongation factor, column 15, lines 25-31); a determination of whether system is operational during maintenance sub-attribute; and an accessibility sub-attribute.

As per claim 31, Abu El Ata discloses a plurality of sub-attributes of said accessibility sub-attribute, said plurality of sub-attributes of said accessibility sub-attribute comprising at least one of a space restrictions determination sub-attribute; a special tool requirements determination sub-attribute; and a special skill requirements determination sub-attribute (i.e., designer determines whether enough models have been displayed to make a selection, column 5, lines 39-41).

As per claim 32, Abu El Ata discloses a plurality of sub-attributes of said testability sub-attribute, said plurality of sub-attributes of said testability sub-attribute comprising at least one of: a BIT Coverage sub-attribute; an error reproducibility sub-attribute (i.e., aging ratio used to predict system inefficiency, column 15, lines 46-51); an online testing sub-attribute; and an automated input/stimulation insertion sub-attribute.

As per claim 33, Abu El Ata discloses a plurality of sub-attributes of said error reproducibility sub-attribute, said plurality of sub-attributes of said error reproducibility sub-attribute comprising at least one of: a logging/recording capability sub-attribute (i.e., system model used to predict performance indicators, column 16, lines 18-20); and a determination of whether system state at time of system failure can be created sub-attribute.

As per claim 34, Abu El Ata discloses a plurality of sub-attributes of said online testing sub-attribute, said plurality of sub-attributes of said online testing sub-attribute comprising at least one of: a determination of whether system is operational during external testing sub-attribute (i.e., percent utilization, column 14, lines 59-65); and an ease of access to external testpoints sub-attribute.

As per claim 35, Abu El Ata discloses decision support system for evaluating the supportability of alternative system architecture designs (i.e., design of information systems to determine the best combination of hardware and software applications, column 1, lines 49-55) comprising: means for assigning relative weights to each attribute and sub-attribute of a plurality of attributes and sub-attributes (i.e., multiplatform system consisting of multiple layers, wherein the volume and weight of each function is described column 9, lines 1-5) of an analytical hierarchy process (AHP) model (i.e., modeling of information system in a top/down approach, column 8, lines 56-63) wherein said plurality of attributes comprises: a commonality attribute (i.e., application architecture layer, column 9, lines 23-27); a modularity sub-attribute (i.e., application architecture layer, column 9, lines 23-27); a standards based attribute (i.e., operating environment layer, column 9, lines 23-27); and a reliability, maintainability, testability (RMT) attribute (i.e., application implementation layer, column 9, lines 23-27), comprising: means for performing pair-wise comparisons of said plurality of attributes and sub-attributes at all levels of said AHP model (i.e., designer makes selection based upon the performance metric of each model in comparison with the other models, column 5, lines 37-42), and means for assigning

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relative weights to all of said attributes and sub-attributes at all levels of said AHP model (i.e., volume and weight of each function carefully described in descriptive input 12, column 9, lines 11-22); means for generating a GPW for each of a plurality of alternative system architecture designs (i.e., calculation of performance metric for each model, column 5, lines 25-27) comprising: means for performing pair-wise comparisons of each of said plurality of alternative system architecture designs with respect to said all of said attributes and sub-attributes at all levels of said AHP model (i.e., designer makes selection based upon the performance metric of each model in comparison with the other models, column 5, lines 37-42); and means for evaluating said plurality of alternative system architecture designs from a supportability perspective comprising comparing values of said GPWs of said plurality of alternative system architecture designs (i.e., designer makes selection based upon the performance metric of each model in comparison with the other models, column 5, lines 37-42).

Claim 36 is rejected based upon the same rationale as the rejection of claim 35, since it contains similar limitations. In addition, Abu El Ata discloses a user interface adapted to display said GPWs to a user and to receive a selection of a preferred system architecture design based on said comparison (i.e., output 28 to an output device, column 4, lines 64-67).

Claims 37-44, 48, and 51-70 are rejected based upon the rejection of claims 35, 2-8, 12, and 15-34, respectively, since they are the method claims corresponding to the system claims.

As per claim 71, Abu El Ata discloses performing sensitivity analysis of said pairwise comparisons (i.e., changing the initial descriptive input provided to the system, column 5, lines 54-56).

Claim 72 is rejected based upon the rejection of claim 35, since it is the computer program product claim corresponding to the system claim.

Claim Rejections - 35 USC § 103

7. Claims 9-11, 13, 14, 45-47, 49, and 50 are rejected under 35 U.S.C. 103(a) as being unpatentable over Abu El Ata (USPN 6,560,569), in view of Kucukcakar (USPN 5,815,715).

As per claim 9, Abu El Ata does not explicitly disclose a plurality of sub-attributes of said physical modularity sub-attribute, said plurality of sub-attributes of said physical modularity sub-attribute comprising at least one of: an ease of system element upgrade sub-attribute; and an ease of operating system element upgrade sub-attribute. Kucukcakar disclose the cost and/or performance of a particular architecture having to fall within a specified acceptance level (i.e., ease of system upgrade, column 2, lines 27-35), wherein the software design phase includes generation of software code in the software design phase (column 6, lines 18-21). Both Abu El Ata and Kucukcakar are concerned with system design, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include ease of system upgrade in Abu El Ata, as seen in

Kucukcakar, in order to meet an acceptable level of cost and/or performance, as disclosed by Kucukcakar, thus making Abu El Ata more robust.

As per claims 10, 11, 13, and 14 Abu El Ata does not disclose at least one of a lines of modified code sub-attribute; and an amount of labor hours for system rework sub-attribute. Kucukcakar disclose the cost and/or performance of a particular architecture having to fall within a specified acceptance level (i.e., ease of system upgrade, column 2, lines 27-35), wherein the software design phase includes generation of software code in the software design phase (column 6, lines 18-21). Both Abu El Ata and Kucukcakar are concerned with system design, therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to include a number of lines of modified code in Abu El Ata, as seen in Kucukcakar, in order to meet an acceptable level of cost and/or performance, as disclosed by Kucukcakar, thus making Abu El Ata more robust.

Claims 45-47, 49, and 50 are rejected based upon the rejection of claims 9-11, 13, and 14, respectively, since they are the method claims corresponding to the system claims.

Response to Arguments

8. In the Remarks, Applicant argues, with respect to claim 1, that Abu El Ata fails to teach an analytic hierarchy process model comprising a plurality of supportability attributes. The Examiner respectfully disagrees and submits that Abu El Ata discloses modeling of information system in a top/down approach (column 8, lines

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56-63) and multiplatform system consisting of multiple layers (column 9, lines 1-5). Moreover, Abu El Ata discloses the evaluation and comparison of possible actions on different technology solutions (column 9, lines 1-5), including a plurality of layers, namely, application architecture, application implementation, operating environment, and hardware/network layers (i.e., supportability attributes, column 9, lines 23-27), thus indeed disclosing an analytic hierarchy process model comprising a plurality of supportability attributes.

Applicant also argues that Abu El Ata fails to disclose a commonality attribute. The Examiner respectfully disagrees and submits that Abu El Ata discloses an application architecture layer (column 9, lines 23-27), wherein the construction module 18 determining that an application will run on a certain type of CPU and use a specific database application (column 6, lines 63-67 and column 7, lines 1-3), thus indeed disclosing a commonality attribute.

Applicant also argues that Abu El Ata fails to disclose a modularity attribute. The Examiner respectfully disagrees and submits that Abu El Ata discloses application architecture layer (column 9, lines 23-27), wherein a library of pre-modeled components allows the information design model the evaluation of the implementation options and the best optimal architecture for a system (column 13, lines 45-51), thus indeed disclosing a modularity attribute.

Applicant also argues that Abu El Ata fails to disclose a standards based attribute. The Examiner respectfully disagrees and submits that Abu El Ata discloses operating environment layer (column 9, lines 23-27), wherein components

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54 and 58 are the results of previously determined benchmarks characterized by a high level of reproducibility (column 13, lines 51-55), thus indeed disclosing a standards based attribute.

Applicant also argues that Abu El Ata fails to disclose a reliability, maintainability, testability (RMT) attribute. The Examiner respectfully disagrees and submits that Abu El Ata discloses an application implementation layer (column 9, lines 23-27), including an aging ration used to determine when the system will become inefficient due to aging effects on the information system (column 15, lines 46-51), thus indeed disclosing an RMT attribute.

Conclusion

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

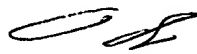
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10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andre Boyce whose telephone number is (571) 272-6726. The examiner can normally be reached on 9:30-6pm M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tariq Hafiz can be reached on (571) 272-6729. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

adb
December 20, 2006


ANDRE BOYCE
PATENT EXAMINER
AU. 3623